

**HORIZONTAL CONCENTRATION
AND EUROPEAN WAGE
MERGER POLICY**

A. JACQUEMIN

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Département des Sciences Economiques
Collège L.-H. Dupriez
Place Montesquieu, 3 - B-1348 Louvain-la-Neuve (Belgique)

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ABSTRACT

The first section of this paper has discussed theoretical arguments and results of empirical studies intended to determine the ability of horizontal mergers to improve the productivity of business assets in the 1992 context. The main conclusion is that although mergers and takeovers could indeed lead to cost savings and efficiency gains, neither theory nor empirical work provides any cast-iron arguments in favour of a presumption that these operations are generally efficient. Furthermore, even when they can be efficient, the corresponding gains must be compared with the effects of a possible increase in monopoly power. This leads to complex tradeoffs where the expected new industry structure following the merger, the degree of openness to international trade and the long-run dynamic performance linked with learning and technical change, are especially relevant aspects in the European context. The second section has shown that a worthwhile pragmatic approach has been adopted in both the application of Article 85 and 86 of the Rome Treaty to mergers, as well as in the proposed new Regulation creating a prior notification of concentrations having a Community dimension. But this paper has also shown that several aspects require a substantial improvement.

Horizontal Concentration and European Merger Policy

Alexis Jacquemin*

Introduction

In the traditional economics of industrial organization, exogenous market structure determines endogenous conduct and the two jointly determine market performance. By contrast, in the New Industrial Organization analysis, not only structure is endogenous but the causal relationships between structure, conduct and performance are different; through strategic commitments, conduct may affect structure, either because it has a lasting effect on cost or demand conditions, or because it influences the belief and hence the behaviour of rivals, in situations of imperfect information.

Mergers and acquisitions constitute a major example of strategies through which market structure and performance can be modified over time in a more or less irreversible way.

In the first section of this policy paper, the main theoretical arguments concerning the costs and benefits of horizontal mergers as a way of modifying market conditions are identified, as well as the exploration of some indicators that could be used to evaluate the probability of these costs and benefits in a European context.

The second section will examine the European merger control proposal based on the dual view that restructuring required by the completion of the European Community's internal market should lead in certain areas, to beneficial concentration operations, but simultaneously, these operations may also create harmful dominant positions.

Section 1 : Costs and benefits of mergers in the European context

A sequence of questions can be asked about the effects of horizontal mergers and take-overs. First, what are the theoretical bases for efficiency gains from mergers, and what is the evidence from empirical studies. Second, to the extent that there is a net positive contribution to resource productivity, what are the key elements for examining the possible trade-off between the benefits of these mergers and the consequences of enhanced market power.

- 1.1. Two main types of benefits can be attributed to mergers: a reduction in production and transaction costs, an improvement in the efficiency of management. But against these potential benefits can also be set possible inefficiencies resulting from mergers.

The role of **economies of scale** in production is well-known. These cost savings can accrue from a better division of labour within the production unit, the spreading of fixed costs, and longer production runs. Mergers which lead to reorganization may help firms to realize these economies and

1) Professor of Economics at the Université Catholique de Louvain and Economic Adviser, Commission of the European Communities, Brussels. The views set out in this paper are expressed in a personal capacity. The paper was prepared for an invited paper session at the meeting of the European Economic Association, Augsburg, September 1989.

to attain the optimum efficient scale. The size of the economies achieved will depend on the slope of the average cost curve for output below the optimum scale. There can also be scale economies in functions such as transport, distribution and research. Besides these static scale economies there is the phenomenon of **learning effects** associated with the increasing experience of production of a good or service. These mean that the cost of producing each extra unit decreases as the cumulative previous output increases. Finally, mention should be made of the role of "scope economies", whereby the sum of the costs of producing two products separately may be higher than the cost of producing them together. Here factors such as complementarity are at work. For example the same indivisible input can be used at once in the production (or distribution) of several goods: by extending its range of products, a firm can thereby reduce its costs. These various phenomena have led many authors (see for example Demsetz 1974, Peltzman 1977) to conclude that high concentration - chiefly brought about by mergers - and large market shares are a sign of efficiency, because they show that firms with low costs have increased their market shares at the expense of the less efficient firms. The low costs lead in the short run to higher profitability.

All these phenomena are thus prompted by the search for efficiency.

But for an organization to be able to benefit from the market advantageously and for such mergers to yield real synergies, machinery within the new entity needs to be set up to make its internal operation efficient. Yet the pitfalls awaiting the large merged organization are legendary : poor communications, sour industrial relations climate, corporate culture clashes, failure to cut out costly duplication, insufficient coordination, and finally lack of flexibility.

In recent years the question of firms' flexibility in an increasingly uncertain world has become more and more important. Some of the difficulties large firms have in adapting to their changing environment may be due to the over-rigid organization imposed in the course of increasing concentration.

In conditions of great uncertainty about the level of demand, the lesser exploitation of economies of scale by small to medium-sized firms using a flexible technology may be more than offset by their ability to respond to changes in demand. To make a success of a merger, it is necessary to organize the merged unit in such a way as to achieve flexible decentralization.

A second possible benefit of mergers arises from the takeover process. The various forms of takeover can be just as effective a means of transferring control of one company's assets to another as a full legal merger, and the replacement of the acquired company's management can likewise lead to better exploitation of its resources. This "**market for corporate control**" also reduces the danger of conflicts of goals between the owners and managers of companies. To the extent that managers have different preferences from shareholders, in terms of profits, sales or degree of risk aversion, the takeover mechanism helps reduce the associated distortions.

The mere threat of takeover is an incentive for management or the controlling shareholder to run the business in the best interests of the company (see "Symposium on takeovers", *Journal of Economic Perspectives*, N°1, Winter 1988). Conversely, many of the defence tactics used against hostile takeovers may be damaging to the interests of the shareholders of the target company and serve only those of its management. A very strict regulation of takeovers might therefore have undesirable consequences (Jarrell, Brickley and Netter 1988).

On the other hand, a basic assumption behind the favourable view of hostile takeovers is that the stock market correctly reflects the value of the acquired and acquiring firms. This is not necessarily the case. The expected benefits may not be realized, with the takeover failing to improve performance but only redistributing profits from the managers to the owners. Moreover, the management of the predator company may be guided by motives other than profit maximization, motives which reflect their own interests and cause them to pay too high a price for the acquisition. Added to this are various considerations concerning the perverse effects that takeover activity can have on the actual management of companies.

Takeovers may absorb a large proportion of management time and induce some managers to give more attention to financial transactions than to productivity and competitiveness. The threat of takeover encourages the maintenance of excessive liquidity and the pursuit of short-term profit, at the expense of strategic investment that would yield a high return only in the long term. There are also dangers in firms taking on increasing debt either to finance or ward off takeovers. In some cases, key assets needed for an industrial growth or diversification strategy are sold off to finance or prevent a takeover. Finally, frequent changes in the controlling shareholders, decision centres and headquarters of companies are apt to affect the ability of management to enter into lasting commitments in relation to specific human capital and their loyalty to the company.

- 1.2. The theoretical arguments about the contribution of mergers to the productivity of the business assets does not yield a general presumption in their favour. It is therefore useful to look at the results of empirical research into the effects of mergers. During the 1960s and 1970s, most mergers in Europe were horizontal rather than vertical or conglomerate. The little research that has been done in this area found that merger activity considerably increased national industrial concentration ratios. (See the results obtained for the UK (Hannah and Kay, 1976), Germany (Müller, 1976), the Netherlands (de Jong, 1976), Sweden (Ryden, 1972)). Over the recent years, there has been a new wave of mergers and acquisitions, partly stimulated by the completion of the European internal market, and the majority of them occur in already concentrated industries.

As for the effects in terms of profitability and growth, many studies point to the absence of substantial efficiency gains. A comparative study, directed by Mueller (1980), of results from various EC countries concerning full legal mergers concluded that:

- (a) tests to identify economies of scale as a possible objective proved insignificant: for one thing, the size of acquiring firms was usually greater than the minimum optimum scale for the industry;
- (b) the tests of post-merger profitability suggested that the mergers had little or no effect on the profitability of the merging firms in the three to five years following the merger; nor was there any significant difference in the return per share three years after the merger. This confirms the results obtained in many American studies (see Scherer, 1980, p.138-139);
- (c) It is also suggested that the chances of success are limited and that the costs of the changes in organization (difficulty of "digesting" the acquisition, diseconomies of large organizations) are often greater than the benefits claimed by the promoters.

This last point is confirmed by detailed studies of the success of mergers in the UK (Meeks, 1977, Cowling et al., 1980). Studies by management consultants come to similar conclusions. Coley and Reinton (1988) looked at US and British companies in the "Fortune" 250 list and the "Financial Times" 500 which in the past had made acquisitions to enter new markets. They conclude that only 23% of the 116 firms analysed were able to recover the cost of their capital or, better still, the funds invested in the acquisition programme. It also appears that the higher the degree of diversification, the smaller is the likelihood of success. For horizontal mergers in which the acquired firm is not large, however, the success rate is around 45%. The main reasons for failure appear to be: too high a price paid for the acquisition, over-estimation of the potential of the acquired business in terms of synergies and market position, and inadequate management of the process of integration after the acquisition.

More generally, there is a striking contrast between ex ante event studies of the corporate mergers' potential gains and the ex post evaluations of the effective results. In his introduction to a recent special issue on "mergers", Mueller (1989) concludes that "prior to the mergers the shares of acquiring firms tend to outperform the market. At the time of the announcement, there is little change in the acquiring firm's share price. The post-acquisition performance of acquiring company share prices is below their pre-merger performance, and in many studies below that of the market. This post-merger performance matches the constant or declining performance of the acquired units measured in profitability, market shares or productivity. This pattern appears to be characteristic of mergers in the United States over at least the last 60 years, and probably the last century. It also appears characteristic of mergers in Europe and Japan."

- 1.3. Given these results, one can conclude that in many cases, there is no real tradeoff between efficiency gains from mergers, notably in the form of cost reductions, and an increase in monopoly power, because in the first place net efficiency gains are simply not there. Still there are situations where the tradeoff can be relevant.

A horizontal merger reducing the number of independent firms permits coordinated use of previously independent productive assets (capital,

patents, trademarks...) and increases concentration in the relevant market. This increase can lead to higher prices and facilitate collusion¹. It is then necessary to compare these risks to competition with the potential efficiency gains.

A seminal paper by Williamson (1968) has proposed a partial equilibrium formula for measuring the respective sizes of cost savings and surplus reductions due to a restriction of output, that a horizontal merger could induce. It is sufficient to compare the surface corresponding to the "deadweight loss", i.e. the loss of consumer welfare which is not otherwise compensated, and the surface corresponding to the savings of resources which become available for alternative use.

However, this "naïve" social cost-benefit analysis requires a number of qualifications including matters of timing and uncertainty, non-price competition and variety of products, x-inefficiency, income distribution effects and so on². Three aspects are especially relevant in the European context : first consideration of the new industry structure following mergers, second the international trade dimension, within the Common Market and with the rest of the world, third the role of mergers in high technology activities.

Concerning the first aspect, it is necessary to have a model of industry's behaviour explaining the adjustments of prices and quantities in response to a merger. Farrell and Shapiro (1988) provide such a model for the Cournot case. A crucial result of their analysis is the role of the response of non-participant firms to any output reduction by the merging parties. If non-participant firms reduce their outputs, the merger may well lower welfare even though it is profitable. The case is most relevant if the merger makes collusion more likely, or if the oligopolists compete in price among differentiated products.³ It is also more probable, the larger the combined market share of the merging firms relative to the (weighted) share of the outsiders. On the contrary, if non-participant firms with large markups expand their outputs noticeably in response to the merger, a significant welfare gain can be provided.⁴

- 1) An illustration of these effects is easily obtained in the case of the Cournot model. See Ordover (1989).
- 2) For a brief review of these aspects see Jacquemin and Slade (1989). For the case of differentiated products, Deneckere and Davidson (1985) show that when the merging firms raise their prices, non-participant firms will do the same since price-reaction schedules slope upward. Mergers will then not increase social welfare.
- 3) Indeed the merger permits the two combined price-competing firms to raise their price and induce non-participant firms to raise the price of competing substitutes.
- 4) Let us recall that in a Cournot equilibrium, large markups are associated with large market shares and large firms have lower marginal costs.

In the European market context, this leads to the consideration of several phenomena.¹ The suppression of non-tariff barriers, by making easier arbitrage for buyers and intermediaries, leads to an expanding market and a larger potential demand, so that there is a high probability that firms not participating in a merger will be very responsive to price increases and will tend to expand their outputs. This conjecture is reinforced in expanding industries, given that a growing market attracts many entries; these entries are relatively easy because incumbent firms have less advantages in terms of cost, experience and reputation, than when established in mature or declining industries. Furthermore, many mergers and takeovers in the EC correspond to a twofold strategy: firms acquire assets in the activities they are best at and sell assets related to activities in which their competitive position is weak; they extend their geographical sphere of operation by buying up firms in other Member States in their core businesses. This trend according to which firms prefer to concentrate on their top-grade products, and increase their geographical diversification, as an alternative to product diversification in a limited geographical area, is compatible with an industry structure favourable to output expansion.² Finally, even a reduction in total output induced by the merger could be compatible with an increase in social welfare if the redistribution of output among firms leads to sufficient cost savings. This possibility is in line with the model of Smith and Venables (1988) applied to the European integration : the lowering of non-tariff barriers could produce a net gain in social welfare even if the number of firms decreases, because the smaller consumer surplus associated with increased concentration would be more than offset by the improvement in returns to producers due to exploitation of economies of scale. Previously mentioned empirical studies indicate however that this is far from being a general case and that we must not overstate the incidence and importance of scale economies in the total population of industries.

On the other hand, existing data suggest that the total number of mergers and acquisitions involving at least one of the top 1000 EC firms has been steadily increasing, from 185 in 1984/85 to 383 in 1987/88 and among these top 1000 firms, firms with sales of over ECU 1 billion were involved in 70% of mergers in 1987/88, compared with 50% in 1984/85. This trend can be dangerous to the extent that positive welfare effects are less probable if the market share of the merging firms is large relative to that of the non-participant firms and to the extent that the more power the merging firms hold pre-merger, the larger the cost reduction has to be in order for the post-merger price to fall.

The **international dimension** is another crucial factor for evaluating the impact of European mergers. It is well known that competition from imports considerably limits the market power of domestic producers. A recent econometric study (Jacquemín and Sapir 1989) using a sample of over one hundred, three digit European manufacturing sectors confirms that imports from intra and extra EC origins exert a significant disciplinary effect on price-cost margins, but with a greater impact played by extra-EC imports. Furthermore, the potential pressure of imports measured by the height of

1) For several of these aspects, see Jacquemin, Buigues and Iliskovitz (1989).

2) See Buigues and Jacquemin (1989).

existing trade barriers as well as actual import competition, has a significant impact. All other things being equal it is therefore probable that mergers in industries relatively open to international trade, from within or outside the Community, are less dangerous for competition than mergers in relatively closed industries. This presumption has been analysed in a series of recent studies. Ross (1988), for instance, shows that the lowering of tariff barriers is more effective in limiting price increasing effects of a merger, the larger the number of foreign firms. However, foreign competition is far from being a perfect substitute for domestic competition in that it is subject to extra uncertainties that do not affect domestic production. Ordover and Willig (1985) have put forward a model which suggests that the effectiveness of competition policy depends on the protectionism of trade policy, via tariffs and quotas. Macroeconomic policy also plays a role: the effect of a reduction in the number of domestic producers is very sensitive not only to the number of foreign firms, but also to the level and variability of the exchange rate. If the main protection against domestic monopoly power is imports, exchange rate volatility will lessen this protection. From this point of view, the European Monetary System indirectly could have a beneficial impact on competition in the common market.

An inverse problem is the monopoly power effect of EC mergers on the rest of the world. If we assume a selfish policy maximising domestic social welfare and ignoring the perverse effects on the rest of the world, the only losses that need be considered by a European merger policy, are the reductions in the European consumer surplus, and the only gains the increase in the profits of European producers.

All things being equal, the net European gain in welfare resulting from a merger would be the greater, the larger the degree of European involvement in the merger and the lower the proportion of the output consumed in Europe.

A third aspect especially relevant in the European context is the role of mergers in **high-technology industries**. Over the recent years, the Community has lost world market shares in several of these sectors (electrical and electronic equipment, information technology...). These industries are highly R&D intensive. This is because of the indivisibilities in R&D up to certain thresholds and because firms require a sufficient scale of operation in order to undertake research programmes. There are many other economic reasons why link-ups between European firms in such industries are justified. They increase the resources available and so encourage the undertaking of more ambitious and risky projects which single firms cannot afford. They also help cut out duplication and may encourage transfers of technology, thus speeding up the dissemination of innovation. Ordover and Baumol (1988) in their analysis of mergers in high-technology industries, conclude that "mergers in high technology industries, in which technologies and products are short-lived, should raise fewer concerns than would similar mergers in industries which have entered their stable phase. This suggestion holds as long as high-technology mergers do not combine firms with large shares of substitute R&D assets that also require large shares of market specific assets for their effective exploitation" (p.32).

On the whole the message here is that when there is a trade-off between static and dynamic efficiency, it is wise to favour the long-run dynamic performance that is expected to ultimately overcome any static loss. Still, the existence of such a trade-off can be questioned in most industries. In fact, evidence suggests that R&D is not characterised by substantial economies of scale and that monopoly power can be expected to inhibit R&D and technological advance in the long run (Neumann, Böbel and Haid 1982, Geroski 1987). Furthermore, avoiding wasteful duplication, internalizing external effects and insuring a large dissemination of knowledge could be obtained through less dangerous devices than full mergers, such as R&D cooperation at the "precompetitive stage" (see Katz 1986, d'Aspremont and Jacquemin 1988). At best, what can be argued is that in industries characterized by short-lived high-technology and rapidly expanding demand, all other things being equal, the prospect of efficiency gains is enhanced and the danger of monopoly power is limited. In the European context however, we observe that the number of mergers and acquisitions involving firms in the top 1 000 has risen significantly less rapidly in the high-growth, high-technology sectors than in the rest of industry.

On the basis of the previous discussion, it is tempting to use some basic criteria to classify, on a *prima facie* basis, industries, according to the expected effects on competition and efficiency. An illustration of this approach is given in Table 1, elaborated for a first screening of European merger proposals. Four indicators among many others have been used: prospects of efficiency gains are based on the relative importance of economies of scale and of technological content, dangers of reduced competition rely on the degree of trade openness and the growth rate of market demand. An application of this type of classification to the 120 European manufacturing industries at the three-digit NACE level has been made in Jacquemin, Buigues and Ilzkovitz (1989).

Section 2 : European policy toward mergers

- 2.1 There is no article in the Treaty of Rome which specifically deals with mergers and acquisitions. However the Commission and the European Court of Justice have interpreted Articles 85 and 86, the two pillars of EC-competition policy, in such a way as to make them partly applicable to mergers.

Article 86 prohibits the abuse of a dominant position. The dominant position referred to in this Article relates to "a position of economic strength enjoyed by an undertaking which enables it to prevent effective competition being maintained on the relevant market by giving it the power to behave, to an appreciable extent, independently of its competitors, customers and ultimately of its consumers" (Decision of the European Court of Justice in the United Brands case, 1978).

Clearly many factors are relevant when establishing dominance. In their decisions, the Commission and the Court commonly look to market shares and barriers to entry. This implies the determination of the product and geographical relevant market, taking into account aspects such as product differentiation and import penetration, and the identification of the conditions of entry based on supply and demand substitutability, existing contracting practices and producer information exchanges. On the other hand and in contrast with the U.S. approach, there is almost no use of numerical guidelines such as a certain change in the Herfindhal index or the ability, after the merger, to raise prices of some fixed percentage above existing levels. The European approach is simultaneously more comprehensive and more pragmatic, which, in the light of the recent theoretical literature, is probably wiser.

It is not illegal to obtain a dominant position: only its abusive exploitation is prohibited. Some examples of such abuses are given in Article 86 itself: the imposition of inequitable prices, the restriction of output, discrimination and tying clauses. These practices correspond to a possible direct misuse of dominance which damages consumers' interests.¹ But a broader conception of an abuse could take into account, not only the direct impact of a market conduct on market performance, but also the indirect effect, through the loop going from market conduct to market structure. In this view, Article 86 could be used to attack business strategies which modify, in a more or less irreversible way, the conditions of supply and demand in such a way that in the end social welfare is harmed.

This is the line of reasoning followed by the Commission and the Court. In the Continental Can case (1973) where Continental Can took the control of the leading Benelux producer of metal cans through its wholly owned Belgian subsidiary, the Court stated that since the concept of abuse is not defined more precisely in Article 86, the Community's objectives set out in the Treaty of Rome must be considered before the examples of abuse given in Article 86 itself. An abuse is present where an enterprise conducts itself in a way that is 'objectively' wrong in relation to the goals of the Treaty: the "provision is not only aimed at practices which may cause damage to consumers directly, but also at those which are detrimental to them through their impact on an effective competition structure, such as is mentioned in Article 3(f) of the Treaty. Abuse may therefore occur if an undertaking in a dominant position strengthens such position in such a way that the degree of dominance reached substantially fetters competition, i.e. that only undertakings remain in the market whose behaviour depends on the dominant one."

Thus the Commission considers that the market structure as such has to be protected: a change in the supply structure which virtually eliminates the alternative sources of supply to the consumer appears to be an abuse in itself. Although the Court annulled the Commission's decision in the Continental Can case - mainly because the relevant market was not

¹) Business practices are usually not obviously abusive and even those mentioned in Article 86 could be not only compatible with competition but may actually enhance it, in a general context of imperfect competition. This can be the case of price discrimination and non-linear pricing.

adequately defined - it very clearly confirmed the soundness of its interpretation: Article 86 may be applied to mergers.¹

More recently the relevance of Article 85 for merger policy has also been established. This Article condemns agreements between firms which may affect competition within the Common Market. In the *Philip Morris* case (1987), the Court decided that agreements on the acquisition of a minority shareholding in a competitor may be caught by Article 85.² This would be the case, the Court considered, especially where by acquisition of a shareholding or additional clauses in the agreement the investing company gained legal or actual control over the commercial behaviour of the other company. The Court also underlined that conduct cannot cease to be anti-competitive merely by reference to the legal form in which it is presented.

Although through these two judgements, the Commission has obtained power to control acquisitions and mergers, this power is still limited and not very effective. With Article 86, the control only concerns firms already dominant and in principle is made after it has occurred.³ But the economic, financial and social costs of an eventual dismemberment after the operation has been fulfilled would be generally prohibitive. Furthermore the absence of clear rules in terms of competence and procedures create legal uncertainty for firms, including possible conflicts of jurisdiction. Article 85 has a very limited domain of application as it requires an agreement and excludes a case of full control.

This explains why the Commission proposed, as far back as in 1973, a specific regulation on Community merger control. In the 1992 perspective and given the corresponding wave of mergers and takeovers, the urgency of this regulation has increased.

The new text elaborated in 1988 is founded upon two main points:³

- (a) The regime to be set up is applicable to major mergers which have a truly European dimension, linked to transnational externalities. The aim should be to prevent both the creation and the enlargement of dominant market positions.

1) Ambiguities remain. According to the Court, it can be considered an abuse if an enterprise extends a dominant position to the point where the objectives of the Treaty are threatened through a substantial alteration of the supply situation, so that the consumer's freedom of action on the market is seriously jeopardised. Hence, to be condemned, the extension must amount to a substantial alteration of the market structure. This implies that distribution between the creation of a dominant and its abuse becomes very doubtful.

2) The case concerned an agreement under which Philip Morris acquired a 30.8% shareholding in its competitor Rothmans International.

3) A third important aspect is to provide legal certainty for firms subject to the controls. This requires that the Commission and the Court have exclusive jurisdiction over mergers of a Community dimension ('one-stop shop') in order to avoid conflicts of jurisdiction and a clear procedure leading to decisions within tight deadlines. For an analysis of these questions, see A. Jacquemin, P. Buigues and F. Ilzkovitz 1989.

- (b) The future regulation also provides for authorization in derogation from the prohibition, on the basis of the efficiency effects of the merger, and applied in close cooperation with an Advisory Committee of national government officials.

Each of them corresponds to delicate economic problems.

- 2.2 In the Commission's proposal, the first two articles state that the mergers covered by the Regulation are those which have a Community dimension; among them, mergers which create or strengthen a dominant position in the Common Market or a substantial part of it are to be condemned. As far as the definition of operation of a Community dimension is concerned, a criterion based on turnover is used. A merger operation is considered to be of a Community dimension and thus subject to regulation "when the total world-wide turnover of the total number of firms concerned represents a sum in excess of one billion ecu, and the total turnover realised within the Community by at least two of the firms involved represents a figure in excess of one hundred million ecu". It is not, however, considered to be an operation with a Community dimension "if each one of the firms concerned realises three-quarters of its total Community turnover within one and the same Member State".

Recourse to such thresholds is guided by a concern to achieve the maximum reduction in the legal insecurity relating to the applicability of the ruling since the calculation of turnover is much more direct than of market shares, and by the desire to limit to an operational level the number of cases to be examined. Whatever the precise numerical values of these thresholds to be adopted in the final version, this choice calls for important caveats. First the use of firm size is clearly suspect both on economic and legal grounds. Size has indeed to be viewed within the context of the relevant market. Second, even for sectors aggregated at a three-digit level, this threshold is sometimes quite high in relation to the amount of economic activity concerned, so that a complete monopolisation would not fall within the scope of application; for other sectors the figure is low when compared with the total value of Community production.

Among the criteria which assist the process of deciding whether or not there exists the creation or the reinforcement of a dominant position are the following:

- market position and economic and financial power of the firms concerned;
- the possibility of choosing suppliers and consumers;
- access to supplies or to markets;
- the structure of the markets affected taking into account international competition;
- barriers to entry (legal or de facto);
- supply and demand trends for the goods or services concerned.

It is to be noted that there is no reference to the existing degree of concentration. Some other criteria are mentioned, such as "market position", "economic and financial power of the firms concerned" and "structure of the markets affected". These factors are at best ambiguous indicators without clear economic content.

Market position, for example, can only be determined by reference to a number of structural features. Market structure itself encompasses the distribution of market shares and entry barriers which are mentioned separately. As for economic and financial power, this probably cannot be equated with a size or performance criterion, since the Court of Justice has explicitly rejected the relevance of these two factors for establishing the existence of a dominant position.

That leaves four criteria:

The "**possibilities of choice of suppliers and consumers**" are key elements in market definition. "**Access to supplies or markets**" is related to vertical integration, but is an important factor in the identification of entry barriers. These are explicitly mentioned under the heading "**the existence of legal or de facto barriers to entry**".

The same applies to "**international competition**", which must be taken into account in defining the relevant market, in measuring market shares and in evaluating entry barriers.

Finally, a dynamic aspect is taken into account in its reference to the "**trend of supply and demand for the goods or services concerned**". As we have seen, such trends can lead to a presumption of greater or lesser competitive pressure.

The overall impression is that the list of criteria for identifying the creation or the reinforcement of a dominant position is unsystematic and needs to be fleshed out by guidelines elucidating their content and their use.

- 2.3 As seen in the previous section, some efficiency gains can be expected from mergers, especially in the context of the restructuring required for the achievement of the internal market. On the other hand empirical evidence on past experience does not justify a general presumption in favour of mergers as a very effective way to achieve the objective of improving the productivity of business assets. It is in this context that the approach adopted in the proposal must be considered.

The rule is that an operation which creates or reinforces a dominant position may be acceptable if the negative effects on competition are more than compensated for by the positive economic effects. This holds true especially if the merger contributes to "improving technical or economic progress or to improving the competitive structure within the common market, taking due account of the competitiveness of the firms concerned with regard to international competition and of the interests of consumers, provided that they do not:

- (a) impose on the firms concerned restriction which are not indispensable to the achievement of the merger, or

(b) afford the firms concerned the possibility of eliminating competition in respect of a substantial part of the goods or services concerned".

This choice of criteria for an efficiency defense reflects the Commission's concern both to have regard to dynamic as well as static economies (improvement in production or distribution, promotion of technical and economic progress). On the other hand, they consider competitive conditions on the international market as well as on the European domestic market (structure of competition within the common market, international competition).

These criteria correspond (imperfectly) to those written in the Article 85 par.3 and according to which a restrictive agreement may be justified. They raise several questions.

First, taking into account simultaneously but also selectively an improvement of "competitiveness of the firms concerned" and/or "the interest of consumers" suggests that the consequences on both producers' surplus and consumers' surplus must be retained. Could some sacrifice of consumer interest for the sake of higher profits then be accepted? In the case of Article 85 par.3, the answer is probably no as a "fair share" of the efficiency gains has to be passed on to customers.

Second, a narrow interpretation of condition (a) is that some restrictive and unnecessary clauses in a partial merger or a joint venture will not be allowed. But a sounder and more demanding approach consistent with Article 85(3) would be that a merger is approved only if the resulting efficiency gains cannot probably be obtained by alternative means (internal growth, cooperation....) less restrictive than the creation or strengthening of a dominant position.

Condition (b) is also ambiguous. The broad interpretation of Article 86 has allowed to consider as an abuse the strengthening of dominant positions. The regulation goes further in condemning the establishment of such a position. It will not be easy then to distinguish between an "elimination of competition in respect of a substantial part of the goods or services concerned" and the creation of a dominant position.

A third point is the silence of the text about the burden of proof as to cost savings or other offsetting efficiencies. To the extent that in the control of mergers the basic question at issue is the likelihood of anticompetitive consequences, it seems appropriate that once a good case has been made on this point by the opponents of a merger, the proponent should support the burden of showing that efficiencies will probably outweigh these consequences. This is reinforced by the fact that the relevant information is clearly in the hands of the merger proponents.

Finally, it should be pointed out that the criteria for assessing the benefits of a merger are inevitably vague. Contrary to national legislation in several countries, the Regulation, wisely, does not contain criteria based on social or regional aspects that could lead to a very dangerous confusion of goals and instruments. But even within the limits of the exemption, the defense on "efficiency grounds" gives the Commission and the Court considerable discretion because it contains an important political dimension. This explains why the competition authorities in countries such as West Germany only scrutinize the implications for

intensity of competition and leave the question of the overall socio-economic issues of the mergers to the Federal Minister of Economics (Jacquemin 1982). To confer on the Commission the responsibility of scrutinizing all aspects of mergers is thought in some quarters to amount to a major transfer of sovereignty by the Member States to a European administrative body, because mergers go to the heart of national restructuring processes and industrial policies.¹

Conclusion

The 1992 program marks a new stage in the European competitive environment and is leading to new challenges for corporate strategies. The observed restructuring taking place is being made through internal and external operations that differ substantially among industries leading to relocation and geographical expansion, new product line selections, better exploitation of scale and scope economies, coordination and concentration of dispersed activities. Mergers and takeovers are one of the possible routes for such a restructuring. The first section of this paper has discussed theoretical arguments and results of empirical studies intended to determine the ability of these operations to improve the productivity of business assets in the new context. The main conclusion is that although mergers and takeovers could indeed lead to cost savings and efficiency gains, neither theory nor empirical work provides any cast-iron arguments in favour of a presumption that these operations are generally efficient. Furthermore, even when they can be efficient, the corresponding gains must be compared with the effects of a possible increase in monopoly power. This leads to complex tradeoffs where the expected new industry structure following the merger, the degree of openness to international trade and the long-run dynamic performance linked with learning and technical change, are especially relevant aspects in the European context. Such complexity suggests that it would be presumptuous to advocate fine tuned optimal merger policy. The second section has shown that a worthwhile pragmatic approach has been adopted in both the application of Article 85 and 86 of the Rome Treaty to mergers, as well as in the proposed new Regulation creating a prior notification of concentrations having a Community dimension. But this paper has also shown that at least two aspects require more analysis.

First, the main criteria for identifying the creation or the strengthening of a dominant position, such as market shares, conditions of entry, international openness, effects on global output, intensity of technology and conducts of firms in the relevant market, must be made more explicit in future guidelines.

Second, the "efficiency" defense must be more precisely defined and avoid the trap of becoming a surreptitious form of industrial policy.

1) That is why the Regulation provides for consultation of an advisory committee of national government officials before any decision relying on the efficiency defense is taken. It could also be required that the considerations on competition grounds are clearly explained and distinct in the decision from all the other socio-economic considerations, for the purpose of transparency and eventual judicial review.

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**Table 1 : Illustration of an industrial classification
according to the expected effects of a merger
on competition and efficiency**

		Prospects of Efficiency Gains (scale economies and technological content)	
		Weak	Strong
Danger of Reduction of Competition (degree of trade openness and growth rate of demand)	Strong	examples : . tobacco products . metal goods	examples : . electrical plant and machinery . railway rolling stock
	Weak	examples : . textiles & clothing . leather goods	examples : . telecommunica- tions . computers